



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/752,894	12/27/2000	Thomas J. Clough	ES-65 - DIV-8	1336
7590	03/23/2005		EXAMINER	VO. HAI
Thomas J. Clough ENSCI Inc. P.O. Box 718 Pismo Beach, CA 93448			ART UNJT	PAPER NUMBER 1771

DATE MAILED: 03/23/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/752,894	CLOUGH, THOMAS J.	
	Examiner	Art Unit	
	Hai Vo	1771	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on 07 March 2005.
 2a) This action is FINAL. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1-3,6-10,15-17 and 20-22 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
 5) Claim(s) _____ is/are allowed.
 6) Claim(s) 1-3,6-10,15-17 and 20-22 is/are rejected.
 7) Claim(s) _____ is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)	4) <input type="checkbox"/> Interview Summary (PTO-413)
2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Date. _____
3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____	5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)
	6) <input type="checkbox"/> Other: _____

Art Unit: 1771

1. The 112 claim rejections have been overcome by the present amendment.
2. The terminal disclaimer filed on 09/27/2004 disclaiming the terminal portion of any patent granted on this application which would extend beyond the expiration date of U.S. 6,514,641 has been reviewed and is accepted. The terminal disclaimer has been recorded. The double patenting rejections are withdrawn in view of the terminal disclaimer. However, upon further consideration, new grounds of rejections are made in view of Clough et al (US 5,549,990), Mathes et al (US 4,371,485) and Stokes et al (US 5,605,739).

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1-3, 6-10, 15-17, and 20-22 are rejected under 35 U.S.C. 102(e) as being anticipated by Clough et al (US 5,549,990).

The applied reference has a common assignee with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any

invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

Clough teaches a porous polypropylene fiber having a porosity in the range from 40% to 90% of the total volume of the fiber (column 14, lines 10-15), a plurality of open cell pores having an average pore size distribution of from 0.075 to 10 microns (column 13, lines 45-46). The fiber has a diameter ranging from 5 to 75 microns within the claimed (column 13, lines 1-5). Clough teaches the pores of the fiber contain sulfuric acid to participate in a number of repetitive discharge and charge cycles (column 16, lines 41-45). Clough teaches the porous fibers having shapes that are reduced in size during the manufacturing (column 16, lines 34-36). Clough does not specifically disclose that the fiber is free flowing. However, the fiber of Clough is made of an organic polymer and appears to meet all the structural limitations including particle size, pore size and porosity. Therefore, it is not seen that the fiber could not have been free flowing. Like material has like property. This is in line with In re Spada, 15 USPQ 2d 1655 (1990) which holds that products of identical chemical composition can not have mutually exclusive properties. Therefore, it is the examiner's position that Clough anticipates the claimed subject matter.

5. Claims 1-3, 9, 16, 21 and 22 are rejected under 35 U.S.C. 102(b) as being anticipated by Mathes et al (US 4,371,485) as evidenced by Stokes et al (US 5,605,739). Mathes teaches a porous polyester fiber having a porosity at least

30% of the total volume of the fiber (column 6, lines 33-35), a plurality of open cell pores having an average pore size distribution of from 50 angstroms to 2 microns (table 10). Mathes teaches a single filament having a denier of about 1.7dtex (column 39, lines 1-5). The fiber would have a diameter within the claimed range based on the calculation disclosed in the Stoke invention. Mathes teaches hydrosetting the fibers in the presence of an effective amount of liquid water(column 39, line 60 et seq.). Likewise, the pores of the fiber contain liquid water. Mathes does not specifically disclose that the fiber is free flowing. However, the fiber of Mathes is made of an organic polymer and appears to meet all the structural limitations including particle size, pore size and porosity. Therefore, it is not seen that the fiber could not have been free flowing. Like material has like property. This is in line with *In re Spada*, 15 USPQ 2d 1655 (1990) which holds that products of identical chemical composition can not have mutually exclusive properties. Mathes does not teach a step of reducing the size of the porous fiber to produce a reduced particle size porous organic polymer particle as recited in the claims; However, the fiber of Mathes has the particle size within the claimed range. Therefore, Applicant's reduced particle size porous organic polymer particle does not exclude Mathes's fiber. It is the examiner's position that Mathes anticipates the claimed subject matter.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 6-8, 10, 15, 17, and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Mathes et al (US 4,371,485) as evidenced by Stokes et al (US 5,605,739) as applied to claims 1, 9 and 16 above, and further in view of Gertisser (US 3,909,192). Mathes does not teach a textile yarn made from polypropylene fibers. Therefore, it is necessary and thus obvious for the skilled artisan to look to the prior art for the yarns formed from polypropylene fibers. Gertisser teaches that both polyester fiber and polypropylene fiber are widely used in textile products (column 2, lines 40-42). Hence, it would have been obvious to one having ordinary skill in the art at the time the invention was made to substitute polypropylene fibers for the polyester fibers of the Mathes invention since two fibers have been shown in the art to recognized equivalent fibers for the textile products.

Double Patenting

8. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory

Art Unit: 1771

double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

9. Claims 1-3, 6-10, 15-17, and 20-22 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-19 of U.S. Patent No. 5,549,990. Although the conflicting claims are not identical, they are not patentably distinct from each other because of the following reasons. The '990 patent discloses every element of the presently claimed subject matter except the shape, particle size, pore size and porosity of the porous particle. However, it appears that the porous particle of the '990 patent is made of the same material as that of the present invention. The porous particle of the '990 patent has the bulk particle density, pore volume, macroporosity and microporosity identical to those disclosed in the present invention (claims 2-7). Since the shape, particle size, pore size and porosity are dictated by the bulk particle density, pore volume, macroporosity and microporosity, it is not seen that the shape, particle size, pore size and porosity would be outside the claimed range as the bulk particle density, pore volume, macroporosity and microporosity are within the claimed range.

Conclusion

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hai Vo whose telephone number is (571) 272-

Art Unit: 1771

1485. The examiner can normally be reached on M,T,Th, F, 7:00-4:30 and on alternating Wednesdays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on (571) 272-1478. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

HV

Hai Vu
Tech Center 1700